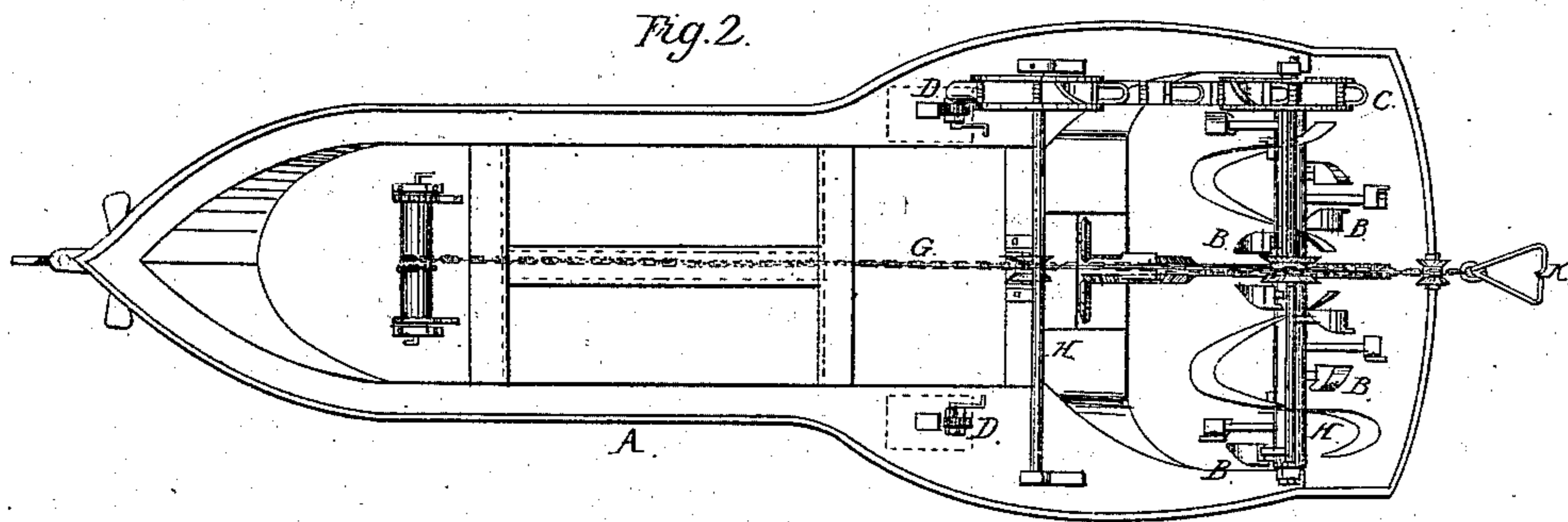
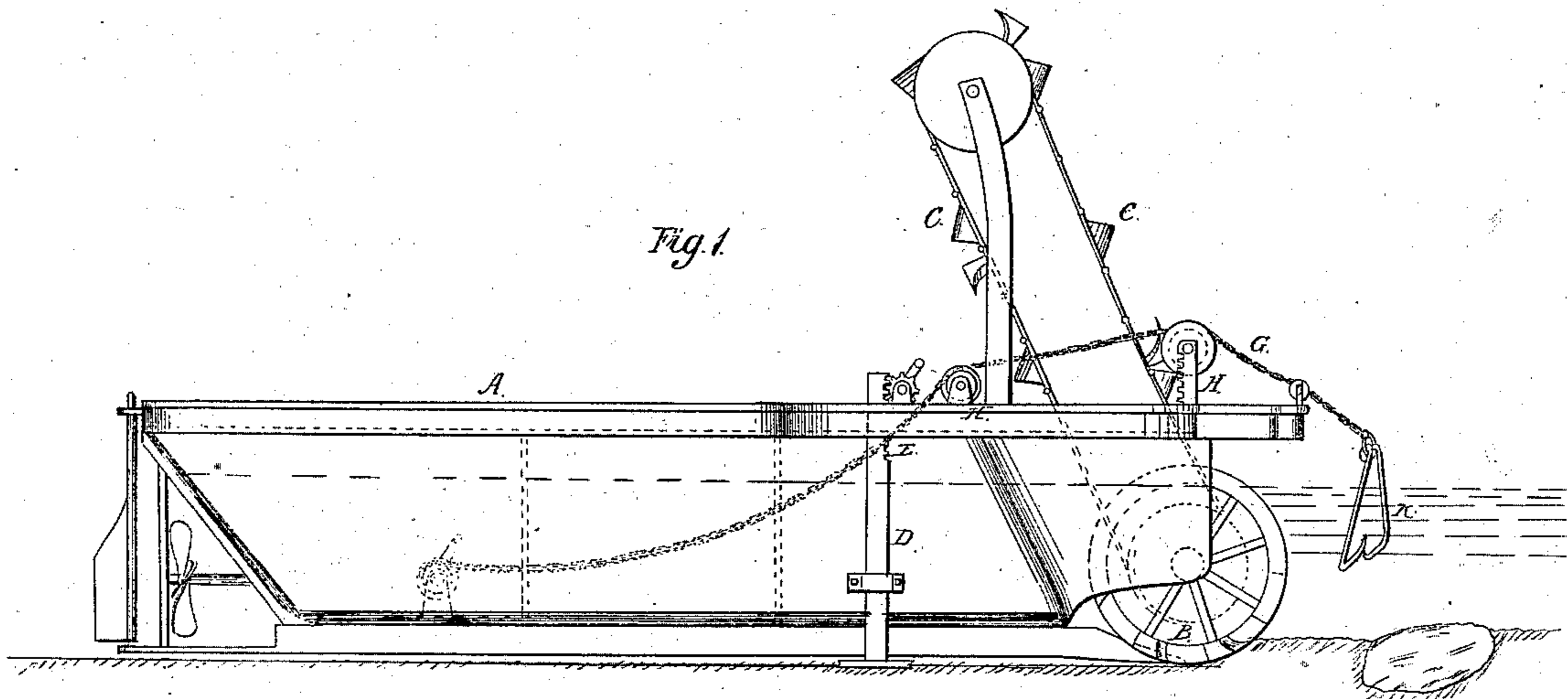


W. H. Nobles,

Dredger,

N^o 56,984

Patented Aug. 7, 1866.



Witnesses:
Lewy Dellenberg
Jacob Roche

Inventor:
William H. Nobles
By his Atty-
J. Franklin Hewitt

UNITED STATES PATENT OFFICE.

W. H. NOBLES, OF ST. PAUL, MINNESOTA.

IMPROVED DREDGING-MACHINE.

Specification forming part of Letters Patent No. 56,984, dated August 7, 1866.

To all whom it may concern:

Be it known that I, WILLIAM H. NOBLES, of St. Paul, county of Ramsey, and State of Minnesota, have invented new and useful Improvements in Steam Dredging-Machines; and I do hereby declare the following to be an exact description thereof, reference being had to the accompanying drawings, and to the letters of reference marked thereon, making a part of this specification, in which—

Figure 1 is a side elevation; Fig. 2, a top view.

The nature of my invention consists in the construction of movable or adjustable stanchions, one on each side of the boat; also, the arrangement and combination of grappling-irons with chain and pulleys, so that rubbish, logs, or rocks lying in a dock, though close to the side of the dock, can be raised and removed.

A represents the boat; B, the revolving plows, arranged spirally, and operating at the front end of the boat to cut and throw up the dirt to be raised and carried off by the bucket C to either side of the boat.

D D are the adjustable stanchions, one on each side of the boat, constructed with a rack, E, at top, for the purpose of being raised and lowered with a ratchet-wheel. The bottom of the stanchion has a broad square base, and the stanchion is intended to rest upon the ground, support the boat on each side, and steady it during the operation of dredging, so as to keep the boat from careening in case the removal of the dirt should bear heavier on one side than the other.

G is a chain attached to an engine, and operating over two or more pulleys suspended at the center line of the boat upon cross-beams H H. At the outer end of the chain are hooks or grappling-irons, K, for the purpose of raising rock, stumps, or other substances that might impede or prevent the operation of the revolving plows B. The chain starts the stump or rock, and acts, in conjunction with the operation of the revolving-plows, so, as the stump or rock rises, the wheel with its plows assist in raising the stump.

Another advantage of my invention is to cut and grapple in marshy lands, and in dry lands the revolving shovels and grappling-irons may be attached to a movable frame in place of the boat, so as to plow up the peat, and raise and lift it up to either side of the revolving plows.

What I claim as my invention, and desire to secure by Letters Patent, is—

1. The construction of the adjustable stanchions E, attached to a boat as herein described, and for the purposes set forth.

2. The arrangement and combination of the chain G, pulleys, and grappling-irons K when arranged and combined with the revolving plows B, as herein described, and for the purposes set forth.

W. H. NOBLES.

Witnesses:

JOHN S. HOLLINGSHEAD,
I. FRANKLIN REIGART.